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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/672,472

09/26/2003

Iain J. McNeill

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PLANTRONICS, INC.

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EXAMINER

ARMSTRONG, ANGELA A

ART UNIT

PAPER NUMBER

2626

MAIL DATE

DELIVERY MODE

10/29/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/672,472	Applicant(s) MCNEILL ET AL.	
	Examiner ANGELA A. ARMSTRONG	Art Unit 2626	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 24 July 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Claims 1, 5, 7-9, 11-12, 17-20, and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dewan (US Patent No. 7,043,008).

Dewan discloses a system and method for selectively monitoring, recording, storing, and handling telephone conversations through the use of speech analysis.

Regarding claim 1, Dewan discloses detecting voice activity on at least one of a receive and a transmit channel in a communication system; outputting voicing decision outputs based on the step of detecting; and generating a voice activity performance metric based on the voicing decision output (col. 2, line 41 continuing to col. 3, line 34). Dewan does not teach storing the voicing decision output in memory. However, storing the voicing decision outputs would allow the supervisor to track information of what type of voicing signal triggered the recording of the telephone conversations which would be used to monitor and evaluate the various agents of whom the calls have to be routed. Therefore, it would have been obvious to modify the system of Dewan to store voicing decision outputs to allow the supervisor to track information of what type of voicing signal triggered the recording of the telephone conversations which would be used to monitor and evaluate the various agents of whom the calls have to be routed.

Regarding claim 5, Dewan discloses the performance metric facilitates detecting at least one of voice strain, stress, and excessive double talk (col. 2, line 41 continuing to col. 3, line 34).

Regarding claim 7, Dewan discloses outputting the voice activity performance metric to a display (col. 2, line 41 continuing to col. 3, line 34).

Regarding claim 8, Dewan discloses the step of detecting is performed throughout an active call via the communication system (col. 2, line 41 continuing to col. 3, line 34).

Regarding claim 9, Dewan discloses the step of detecting includes detecting voice activity on both the receive channel and the transmit channel in the communications system (col. 2, line 41 continuing to col. 3, line 34).

Regarding claim 11, Dewan discloses automatically routing calls based at least in part on the voice activity performance metric (col. 2, line 41 continuing to col. 3, line 34).

Regarding claims 12, 17-20 and 22: claims 12, 17-20 and 22 are similar in scope and content to claims 1, 5, 7-9 and 11, and therefore are rejected under similar rationale.

Claims 2-4, 6, 10, 13-16, and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dewan in view of Maloney et al (US Patent No. 5,696,811).

Regarding claims 2-4, 6, 10, 13-16, and 21 Dewan does not teach monitoring the conversations over a predetermined period of time or tracking the durations of the phone calls. Maloney discloses a method and system for automatically monitoring the performance quality of call center service representatives. Maloney discloses the system is available for monitoring for a specific time or range, tracking the number of extensions monitored, the number of channels monitored, the duration of the monitoring periods, time intervals of monitoring periods, and generates a report to the supervisor (col. 5, line 18 to col. 14, line 44). Maloney discloses the system assists in ensuring consistency and equity across call center agent performance evaluation. It would have been obvious to one of ordinary skill at the time of the invention to modify the system of Dewan to implement monitoring at predetermined time periods and tracking duration and time interval information associated with call center agent phone calls, as

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suggested by Maloney, for the purpose of ensuring consistency and equity across call center agent performance evaluation.

Response to Arguments

3. Applicant's arguments filed July 24, 2008, have been fully considered but they are not persuasive. Applicant argues Dewan does not teach detecting voice activity. The Examiner cannot concur. Dewan discloses the system detects variations in frequency and amplitude and monitors the conversations for deviations in frequency and/or amplitude falling outside a threshold range. Detecting variations in frequency and amplitude of a speech signal detects changes in the voice activity from no speech (zero amplitude) to the start of speech (increase or variation in amplitude) detects voice activity and thus provides adequate support for the claim limitation.

4. Applicant argues Dewan does not teach storing outputs from the voice activity detector. In response, the Examiner argues, as indicated in the previous rejection and in the rejection above, Dewan does not teach storing the voicing decision output in memory. However, storing the voicing decision outputs would allow the supervisor to track information of what type of voicing signal triggered the recording of the telephone conversations which would be used to monitor and evaluate the various agents of whom the calls have to be routed. The Examiner maintains that it would have been obvious to modify the system of Dewan to store voicing decision outputs to allow the supervisor to track information of what type of voicing signal triggered the recording of the telephone conversations which would be used to monitor and evaluate the various agents of whom the calls have to be routed.

5. Applicant argues Dewan does not teach generating a performance metric based on the voice activity detection outputs. The Examiner cannot concur. Dewan discloses the system detects variations in frequency and amplitude and monitors the conversations for deviations in frequency and/or amplitude falling outside a threshold range. Detecting variations in frequency and amplitude of a speech signal detects changes in the voice activity from no speech (zero amplitude) to the start of speech (increase or variation in amplitude) detects voice activity and thus provides adequate support for the claim limitation. Dewan also teaches the detected variations are used to monitor changes in emotions of the parties involved in communications.

Conclusion

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANGELA A. ARMSTRONG whose telephone number is (571)272-7598. The examiner can normally be reached on Monday-Thursday 11:30-8:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick N. Edouard can be reached on 571-272-7603. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Angela A Armstrong/

Primary Examiner, Art Unit 2626